

Amendments to the Claims:

The following listing of claims will replace all prior versions, and listings, of claims in the application:

1. (Currently Amended) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of said television cameras;

and wherein

said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image ~~processing~~ processing to position the optical axes and end faces of optical fibers.

2. (Currently Amended) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of said television cameras;

and wherein

said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be

switched in synchronous with or independently from progress of the image ~~processing~~,
processing to position the optical axes and end faces of optical fibers, and said capturing
 modes of said image capturing means include at least two of a capturing mode in which the
 image data can be captured from said television cameras from frame to frame and the image
 data from said television cameras can be captured by successively switching said television
 cameras from frame to frame, a capturing mode in which the image data can be captured from
 said television cameras from field to field and the image data from said television cameras can
 be captured by successively switching said television cameras from field to field and a
 capturing mode in which the image data can be captured from said television cameras from
 pixel to pixel and the image data from said television cameras can be captured by successively
 switching said television cameras from pixel to pixel.

3. (Currently Amended) An optical fiber observing image processing apparatus in
 which positioning of optical axes and end faces of optical fibers can be automatically
 controlled by capturing and processing image data of the optical fibers photo-taken by
 television cameras, comprising:

an image capturing means capable of capturing image data from two or more
 television cameras and capable of capturing and image-processing only desired image data
 from each of said television cameras;

and wherein

said image capturing means has two or more different capturing modes
 regarding the capturing of the image data, and said capturing modes can automatically be
 switched in synchronous with or independently from progress of the image ~~processing~~,
processing to position the optical axes and end faces of optical fibers, and said capturing
 means has a capturing mode in which a field of the respective television camera is divided into

two or more so that the desired television camera is assigned to the respective divided field to capture the image data of the plural television cameras into one field in a multiplexing form.

4. (Currently Amended) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of said television cameras;

and wherein

said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image ~~processing,~~ processing to position the optical axes and end faces of optical fibers, and said capturing modes of said image capturing means include at least two of a capturing mode in which the image data can be captured from said television cameras from frame to frame and the image data from said television cameras can be captured by successively switching said television cameras from frame to frame, a capturing mode in which the image data can be captured from said television cameras from field to field and the image data from said television cameras can be captured by successively switching said television cameras from field to field and a capturing mode in which the image data can be captured from said television cameras from pixel to pixel and the image data from said television cameras can be captured by successively switching said television cameras from pixel to pixel and has a capturing mode in which a field of the respective television camera is divided into two or more so that the desired television

camera is assigned to the respective divided field to capture the image data of the plural television cameras into one field in a multiplexing form.

5. (Currently Amended) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of said television cameras;

and wherein

said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image processing, processing to position the optical axes and end faces of optical fibers, and said capturing means has a capturing mode in which one scanning line of the respective television camera is divided into two or more so that the desired television camera is assigned to the respective divided scanning line to capture the image data of the plural television cameras onto one scanning line in a multiplexing form.

6. (Currently Amended) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of said television cameras;

and wherein

said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image processing, processing to position the optical axes and end faces of optical fibers, and said capturing modes of said image capturing means include at least two of a capturing mode in which the image data can be captured from said television cameras from frame to frame and the image data from said television cameras can be captured by successively switching said television cameras from frame to frame, a capturing mode in which the image data can be captured from said television cameras from field to field and the image data from said television cameras can be captured by successively switching said television cameras from field to field and a capturing mode in which the image data can be captured from said television cameras from pixel to pixel and the image data from said television cameras can be captured by successively switching said television cameras from pixel to pixel and has a capturing mode in which one scanning line of the respective television camera is divided into two or more so that the desired television camera is assigned to the respective divided scanning line to capture the image data of the plural television cameras onto one scanning line in a multiplexing form.

7. (Withdrawn) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of said television cameras;

and wherein

said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image processing, and further wherein

the image data capturing by said image capturing means can be outputted onto a television monitor and the like through a scanning converting means.

8. (Withdrawn) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of said television cameras;

and wherein said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image processing, and said capturing modes of said image capturing means include at least two of a capturing mode in which the image data can be captured from said television cameras from frame to frame and the image data from said television cameras can be captured by successively switching said television cameras from frame to frame, a capturing mode in which the image data can be captured from said television cameras from field to field and the image data from said television cameras can be captured by successively switching said television cameras from field to field and a capturing mode in which the image data can be captured from said television cameras from pixel to pixel and the image data from said television cameras can be captured by successively switching said television cameras from pixel to pixel,

and further wherein

the image data captured by said image capturing means can be outputted onto a television monitor and the like through a scanning converting means.

9. (Withdrawn) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of the television cameras;

and wherein

said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image processing, and said capturing means has a capturing mode in which a field of the respective television camera is divided into two or more so that the desired television camera is assigned to the respective divided field to capture the image data of the plural television cameras into one field in a multiplexing form,

and further wherein

the image data captured by said image capturing means can be outputted onto a television monitor and the like through a scanning converting means.

10. (Withdrawn) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of the television cameras,

and wherein

e' said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image processing, and said capturing modes of said image capturing means include at least two of a capturing mode in which the image data can be captured from the television cameras from frame to frame and the image data from said television cameras can be captured by successively switching said television cameras from frame to frame, a capturing mode in which the image data can be captured from said television cameras from field to field and the image data from said television cameras can be captured by successively switching said television cameras from field to field and a capturing mode in which the image data can be captured from said television cameras from pixel to pixel and the image data from said television cameras can be captured by successively switching said television cameras from pixel to pixel and has a capturing mode in which a field of the respective television camera is divided into two or more so that the desired television camera is assigned to the respective divided field to capture the image data of the plural television cameras into one field in a multiplexing form,

and further wherein

the image data captured by said image capturing means can be outputted onto a television monitor and the like through a scanning converting means.

11. (Withdrawn) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by

capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of the television cameras;

and wherein

said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image processing, and said capturing means has a capturing mode in which one scanning line of the respective television camera is divided into two or more so that the desired television camera is assigned to the respective divided scanning line to capture the image data of the plural television cameras onto one scanning line in a multiplexing form,

and further wherein

the image data captured by said image capturing means can be outputted onto a television monitor and the like through a scanning converting means.

12. (Withdrawn) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of the television cameras;

and wherein

said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image processing, and said capturing modes of said image capturing means include at least two of a capturing mode in which the image data can be captured from said television cameras from frame to frame and the image data from said television cameras can be captured by successively switching said television cameras from frame to frame, a capturing mode in which the image data can be captured from said television cameras from field to field and the image data from said television cameras can be captured by successively switching said television cameras from field to field and a capturing mode in which the image data can be captured from said television cameras from pixel to pixel and the image data from said television cameras can be captured by successively switching said television cameras from pixel to pixel and has a capturing mode in which one scanning line of the respective television camera is divided into two or more so that the desired television camera is assigned to the respective divided scanning line to capture the image data of the plural television cameras onto one scanning line in a multiplexing form, and further wherein

the image data captured by said image capturing means can be outputted onto a television monitor and the like through a scanning converting means.

13. (Withdrawn) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of the television cameras;

and wherein

said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image processing,

and further wherein

the image data captured by said image capturing means can be outputted onto a television monitor and the like through a scanning converting means,

and at least two different transfer modes are provided for transferring of the image data between said image capturing means and said scanning converting means.

14. (Withdrawn) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of said television cameras;

and wherein

said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image processing, and said capturing modes of said image capturing means include at least two of a capturing mode in which the image data can be captured from said television cameras from frame to frame and the image data from said television cameras can be captured by successively switching said television cameras from frame to frame, a capturing mode in which the image data can be captured from said television cameras from field to field and the image data from said

television cameras can be captured by successively switching said television cameras from field to field and a capturing mode in which the image data can be captured from said television cameras from pixel to pixel and the image data from said television cameras can be captured by successively switching said television cameras from pixel to pixel,

and further wherein

the image data captured by said image capturing means can be outputted onto a television monitor and the like through a scanning converting means, and at least two different transfer modes are provided for transferring of the image data between said image capturing means and said scanning converting means.

15. (Withdrawn) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of said television cameras;

and wherein

said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image processing, and said capturing means has a capturing mode in which a field of the respective television camera is divided into two or more so that the desired television camera is assigned to the respective divided field to capture the image data of the plural television cameras into one field in a multiplexing form,

and further wherein

the image data captured by said image capturing means can be outputted onto a television monitor and the like through a scanning converting means, and at least two different transfer modes are provided for transferring of the image data between said image capturing means and said scanning converting means.

16. (Withdrawn) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of said television cameras;

and wherein

said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image processing, and said capturing modes of said image capturing means include at least two of a capturing mode in which the image data can be captured from said television cameras from frame to frame and the image data from said television cameras can be captured by successively switching said television cameras from frame to frame, a capturing mode in which the image data can be captured from said television cameras from field to field and the image data from said television cameras can be captured by successively switching said television cameras from field to field and a capturing mode in which the image data can be captured from said television cameras from pixel to pixel and the image data from said television cameras can be captured by successively switching said television cameras from pixel to pixel and has a capturing mode in which a field of the respective television camera is divided into two or more so that the

desired television camera is assigned to the respective divided field to capture the image data of the plural television cameras into one field in a multiplexing form,

and further wherein

the image data captured by said image capturing means can be outputted onto a television monitor and the like through a scanning converting means, and at least two different transfer modes are provided for transferring of the image data between said image capturing means and said scanning converting means.

17. (Withdrawn) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of said television cameras;

and wherein

said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image processing, and said capturing means has a capturing mode in which one scanning line of the respective television camera is divided into two or more so that the desired television camera is assigned to the respective divided scanning line to capture the image data of the plural television cameras onto one scanning line in a multiplexing form,

and further wherein

the image data captured by said image capturing means can be outputted onto a television monitor and the like through a scanning converting means, and at least two different

transfer modes are provided for transferring of the image data between said image capturing means and said scanning converting means.

18. (Withdrawn) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of said television cameras:

and wherein

said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image processing, and said capturing modes of said image capturing means include at least two of a capturing mode in which the image data can be captured from said television cameras from frame to frame and the image data from said television cameras can be captured by successively switching said television cameras from frame to frame, a capturing mode in which the image data can be captured from said television cameras from field to field and the image data from said television cameras can be captured by successively switching said television cameras from field to field and a capturing mode in which the image data can be captured from said television cameras from pixel to pixel and the image data from said television cameras can be captured by successively switching said television cameras from pixel to pixel and has a capturing mode in which one scanning line of the respective television camera is divided into two or more so that the desired television camera is assigned to the respective divided scanning line to capture the image data of the plural television cameras onto one scanning line in a multiplexing form,

and further wherein

the image data captured by said image capturing means can be outputted onto a television monitor and the like through a scanning converting means, and at least two different transfer modes are provided for transferring of the image data between said image capturing means and said scanning converting means.

19. (Withdrawn) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of said television cameras;

and wherein

said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image processing,

and further wherein

the image data captured by said image capturing means can be outputted onto a television monitor and the like through a scanning converting means, and at least two different transfer modes are provided for transferring of the image data between said image capturing means and said scanning converting means, and said transfer modes can automatically be switched in synchronous with or independently from the progress of the image processing.

20. (Withdrawn) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by

capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of said television cameras;

and wherein

Q' said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image processing, and said capturing modes of said image capturing means include at least two of a capturing mode in which the image data can be captured from said television cameras from frame to frame and the image data from said television cameras can be captured by successively switching said television cameras from frame to frame, a capturing mode in which the image data can be captured from said television cameras from field to field and the image data from said television cameras can be captured by successively switching said television cameras from field to field and a capturing mode in which the image data can be captured from said television cameras from pixel to pixel and the image data from said television cameras can be captured by successively switching said television cameras from pixel to pixel,

and further wherein

the image data captured by said image capturing means can be outputted onto a television monitor and the like through a scanning converting means, and at least two different transfer modes are provided for transferring of the image data between said image capturing means and said scanning converting means, and said transfer modes can automatically be switched in synchronous with or independently from the progress of the image processing.

21. (Withdrawn) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of said television cameras;

and wherein

21' said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image processing, and said image capturing means has a capturing mode in which a field of the respective television camera is divided into two or more so that the desired television camera is assigned to the respective divided field to capture the image data of the plural television cameras into one field in a multiplexing form,

and further wherein

the image data captured by said image capturing means can be outputted onto a television monitor and the like through a scanning converting means, and at least two different transfer modes are provided for transferring of the image data between said image capturing means and said scanning converting means, and said transfer modes can automatically be switched in synchronous with or independently from the progress of the image processing.

22. (Withdrawn) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of said television cameras;

and wherein

said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image processing, and said capturing modes of said image capturing means include at least two of a capturing mode in which the image data can be captured from said television cameras from frame to frame and the image data from said television cameras can be captured by successively switching said television cameras from frame to frame, a capturing mode in which the image data can be captured from said television cameras from field to field and the image data from said television cameras can be captured by successively switching said television cameras from field to field and a capturing mode in which the image data can be captured from said television cameras from pixel to pixel and the image data from said television cameras can be captured by successively switching said television cameras from pixel to pixel and has a capturing mode in which a field of the respective television camera is divided into two or more so that the desired television camera is assigned to the respective divided field to capture the image data of the plural television cameras into one field in a multiplexing form,

and further wherein

the image data captured by said image capturing means can be outputted onto a television monitor and the like through a scanning converting means, and at least two different transfer modes are provided for transferring of the image data between said image capturing means and said scanning converting means, and said transfer modes can automatically be switched in synchronous with or independently from the progress of the image processing.

23. (Withdrawn) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image- data from two or more television cameras and capable of capturing and image-processing only desired image data from each of said television cameras;

and wherein

e' said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image processing, and said image capturing means has a capturing mode in which one scanning line of the respective television camera is divided into two or more so that the desired television camera is assigned to the respective divided scanning line to capture the image data of the plural television cameras onto one scanning line in a multiplexing form,

and further wherein

the image data captured by said image capturing means can be outputted onto a television monitor and the like through a scanning converting means, and at least two different transfer modes are provided for transferring of the image data between said image capturing means and said scanning converting means, and said transfer modes can automatically be switched in synchronous with or independently from the progress of the image processing.

24. (Withdrawn) An optical fiber observing image processing apparatus in which positioning of optical axes and end faces of optical fibers can be automatically controlled by capturing and processing image data of the optical fibers photo-taken by television cameras, comprising:

an image capturing means capable of capturing image data from two or more television cameras and capable of capturing and image-processing only desired image data from each of said television cameras;

and wherein

said image capturing means has two or more different capturing modes regarding the capturing of the image data, and said capturing modes can automatically be switched in synchronous with or independently from progress of the image processing, and said capturing modes of said image capturing means include at least two of a capturing mode in which the image data can be captured from said television cameras from frame to frame and the image data from said television cameras can be captured by successively switching said television cameras from frame to frame, a capturing mode in which the image data can be captured from said television cameras from field to field and the image data from said television cameras can be captured by successively switching said television cameras from field to field and a capturing mode in which the image data can be captured from said television cameras from pixel to pixel and the image data from said television cameras can be captured by successively switching said television cameras from pixel to pixel and has a capturing mode in which one scanning line of the respective television camera is divided into two or more so that the desired television camera is assigned to the respective divided scanning line to capture the image data of the plural television cameras onto one scanning line in multiplexing form,

and further wherein

the image data captured by said image capturing means can be outputted onto a television monitor and the like through a scanning converting means, and at least two different transfer modes are provided for transferring of the image data between said image capturing means and said scanning converting means, and said transfer modes can automatically be switched in synchronous with or independently from the progress of the image processing.

25. (Withdrawn) An optical fiber observing image processing apparatus

2 / according to claim 1, further comprising a delay means capable of setting a desired delay time for image data.
